

SYSTEM AND METHOD FOR DETECTING WHEN AN EXTERNAL LOAD IS
COUPLED TO A VIDEO DIGITAL-TO-ANALOG CONVERTER

ABSTRACT OF THE INVENTION

5 A system and method for determining when an external
load is coupled to a digital-to-analog converter (DAC).
Specifically, in one embodiment, a load detector circuit
comprises a video DAC, an output circuit, a dumping circuit,
and a determining circuit. The video DAC comprises a
10 differential architecture including a first output and a
second output working in opposite phase. The first DAC
output is coupled to the output circuit, which drives the
external load. The second DAC output is coupled to a dumping
circuit, and is configured such that the dumping circuit is
15 balanced with the output circuit when the external load is
present. A determining circuit examines the two outputs of
the DAC to determine if the dumping circuit is balanced with
the output circuit, and thus if the external load is present.